ELSEVIER

Physica C 230 (1994) 443–446

PHYSICA C

Author index to volume 230

Abell, S., see L.F. Cohen **230**, 1
Achenbach, C.A., see J.A. Schlueter **230**, 378
Alfred-Duplan, C., see A. Benlhachemi **230**, 246
André, M.-O., see G. D'Anna **230**, 115
Angurel, L.A., F. Lera, C. Rillo and R. Navarro, Intergranular properties of YBCO and BSCCO ceramic superconductors at low fields **230**, 361
Arashi, H., see M. Kakihana **230**, 199

Babcock, S.E., see J.-L. Wang **230**, 189
Bari, M.A., see B. Ghyselen **230**, 327
Barner, J.B., see B.D. Hunt **230**, 141
Bayless, W.R., see J.A. Schlueter **230**, 378
Bazuev, G.V., V.N. Krasilnikov, N.A. Kirsanov and N.V. Lukin, New oxygen-deficient perovskite $LaCu_{1-x}Ni_xO_{2.5+\delta}$ with anomalous thermal, electrical and magnetic properties **230**, 163
Beille, J., see J.G. Noudem **230**, 42
Beňačka, Š., see Š. Chromik **230**, 82
Benlhachemi, A., J.R. Gavarri, J. Musso, C. Alfred-Duplan and J. Marfaing, High-T_c superconductor/polymer composites. Modeling of abnormal electrical properties at low temperature **230**, 246
Benoit, W., see G. D'Anna **230**, 115
Bessière, M., see H. Renevier **230**, 31
Blamire, M.G., see B. Ghyselen **230**, 327
Börjesson, L., see M. Kakihana **230**, 199
Bourgault, D., see J.G. Noudem **230**, 42
Bukowski, Z., see T. Plackowski **230**, 354
Burmester, C.P., L.T. Wille and R. Gronsky, Microscopic model and computer simulation of detwinning in $YBa_2Cu_3O_z$ **230**, 16

Cai, X.Y., see J.-L. Wang **230**, 189
Canfield, P.C., B.K. Cho, D.C. Johnston, D.K. Finnemore and M.F. Hundley, Specific heat and anisotropic superconducting and normal-state magnetization of $HoNi_2B_2C$ **230**, 397
Cao, Y., see Y.Y. Sun **230**, 435
Caplin, A.D., see L.F. Cohen **230**, 1
Carlson, K.D., see J.A. Schlueter **230**, 378
Chan, W.C., D.S. Jwo, Y.F. Lin and Y. Huang, Magnetic levitation of $YBa_2Cu_3O_y$ single crystals **230**, 349
Chen, B.-H., see B.A. Scott **230**, 239
Chen, X.L., see J.R. Min **230**, 389
Chen, Z., see L.-B. Wang **230**, 263
Cheng, H.-F., C.-H. Lin, H.-Y. Lin, J.-T. Lo, T.-F. Tseng, K.-S. Liu and I.-N. Lin, Influence of the characteristics of a $SrTiO_3$ buffer layer on the superconductivity of laser-ablated $YBa_2Cu_3O_{7-\delta}$ films **230**, 267
Chew, N.G., see M.N. Keene **230**, 110
Chiodelli, G., see M. Scavini **230**, 412
Chmaissem, O., L. Wessels and Z.Z. Sheng, Synthesis and characterization of $HgBa_2Ca_{n-1}Cu_nO_{2n+2+\delta}$ ($n=1$, 2, and 3) **230**, 231
Cho, B.K., see P.C. Canfield **230**, 397
Chromik, Š., M. Jergel, F. Hanic, Š. Beňačka, J. Liday, H. Tollet and C. Creemers, Distribution of fluorine in YBCO thin films prepared by BaF_2 technique **230**, 82
Chu, C.W., see Y.Y. Sun **230**, 435
Cohen, L.F., A.A. Zhukov, G. Perkins, H.J. Jensen, S.A. Klestov, V.I. Voronkova, S. Abell, H. Kupfer, T. Wolf and A.D. Caplin, Detailed magnetic-relaxation measurements of $(Y, Tm)Ba_2Cu_3O_{7-\delta}$ crystals. Implications for the H–T diagram **230**, 1
Coulter, J.Y., see L.J. Masur **230**, 274
Craven, C.A., see L.J. Masur **230**, 274
Creemers, C., see Š. Chromik **230**, 82

D'Anna, G., M.-O. André, M.V. Indenbom and W. Benoit, Pinning in the flux-line-cutting regime of $Bi_2Sr_2Ca_1Cu_2O_8$ single crystals at high field **230**, 115
DeLong, L.E., see J.G. Sereni **230**, 159
Dong, C., see W.J. Zhu **230**, 385
Dong, C., see J.R. Min **230**, 389
Dudek, J.D., see J.A. Schlueter **230**, 378
D'yachkova, T., see A. Podlesnyak **230**, 311
Dzenzersky, V.A., see O.I. Gorsky **230**, 213

Edwards, J.A., see M.N. Keene **230**, 110
Elkaïm, E., see H. Renevier **230**, 31
Evetts, J.E., see B. Ghyselen **230**, 327

Fendrich, J.A., see J.A. Schlueter **230**, 378
Feng, Sh.J., see W.J. Yu **230**, 323
Fil, D.V. and O.I. Tokar, Oscillations of the phonon spectra due to anion–lattice coupling **230**, 207
Fink, J., see M. Knupfer **230**, 121
Finnemore, D.K., see P.C. Canfield **230**, 397
Fischer, D.A., see A.R. Moodenbaugh **230**, 177
Fistul', M.V. and G.F. Giuliani, Magnetic field dependence of

the critical current of a layered superconductor **230**, 9
Flor, G., see M. Scavini **230**, 412
Foote, M.C., see B.D. Hunt **230**, 141
Forkl, A., see R. Knorpp **230**, 128
Fujita, T., see K. Yoshida **230**, 371
Funahashi, S., see Y. Miyazaki **230**, 89
Furrer, A., see A. Podlesnyak **230**, 311

Gautier-Picard, P., see Y.Y. Sun **230**, 435
Gavarri, J.R., see A. Benlhachemi **230**, 246
Geiser, U., see J.A. Schlueter **230**, 378
Ghyselen, B., M.A. Bari, E.J. Tarte, M.G. Blamire, R.E. Somekh, Y. Yan and J.E. Evetts, Josephson junctions based on *c*-axis oriented YBaCuO/PrBaCuO/YBaCuO trilayers **230**, 327
Giuliani, G.F., see M.V. Fistul' **230**, 9
González-Calbet, J.M., see M. Vallet-Regí **230**, 407
Goodyear, S.W., see M.N. Keene **230**, 110
Gorsky, O.I., V.A. Dzenzersky, V.I. Lyashenko, G.R. Shustov and E.A. Zeldina, The low-temperature superconducting magnet suspension system **230**, 213
Goshchitskii, B., see A. Podlesnyak **230**, 311
Gronsky, R., see C.P. Burmester **230**, 16

Habermeier, H.-U., see R. Knorpp **230**, 128
Hanic, F., see Š. Chromik **230**, 82
Hegde, M.S., see S. Ramesh **230**, 135
Hellerqvist, M.C., S. Ryu, L.W. Lombardo and A. Kapitulnik, Vortex decoupling crossover in $Bi_2Sr_2CaCu_2O_8$ **230**, 170
Hilgenkamp, J.W.M., see C. Træholt **230**, 425
Hiraga, K., see Y. Miyazaki **230**, 89
Hirai, T., see Y. Miyazaki **230**, 89
Hirakawa, K., see X.G. Zheng **230**, 306
Hodeau, J.L., see H. Renevier **230**, 31
Huang, Y., see W.C. Chan **230**, 349
Huang, Y.Z., see W.J. Zhu **230**, 385
Huber, J.G., see J.G. Sereni **230**, 159
Humphreys, R.G., see M.N. Keene **230**, 110
Hundley, M.F., see P.C. Canfield **230**, 397
Hunt, B.D., M.C. Foote, W.T. Pike, J.B. Barner and R.P. Vasquez, High-T_c edge-geometry SNS weak links on silicon-on-sapphire substrates **230**, 141
Hwang, H.L., see M.W. Lee **230**, 292

Indenbom, M.V., see G. D'Anna **230**, 115

Jensen, H.J., see L.F. Cohen **230**, 1
Jergel, M., see Š. Chromik **230**, 82
Johnston, D.C., see P.C. Canfield **230**, 397
Jwo, D.S., see W.C. Chan **230**, 349

Kadyrova, H., see A. Podlesnyak **230**, 311
Kaiser, A.B., see C.K. Subramaniam **230**, 184
Kajitani, T., see Y. Miyazaki **230**, 89
Kakihana, M., H. Arashi, M. Yashima, M. Yoshimura, L. Börjesson and M. Käll, Anomalous behaviour of the 147 cm^{-1} Cu(2) Raman mode in $YBa_2Cu_4O_8$ under high pressure. Signature of change in the electronic state of the CuO_2 plane **230**, 199
Kaldis, E., see M. Knupfer **230**, 121
Käll, M., see M. Kakihana **230**, 199
Kao, H.-C.I., see M.W. Lee **230**, 292
Kapitulnik, A., see M.C. Hellerqvist **230**, 170
Karpinski, J., see M. Knupfer **230**, 121
Keane, P.M., see J.A. Schlueter **230**, 378
Keene, M.N., N.G. Chew, S.W. Goodyear, J.A. Edwards, R.G. Humphreys, K. Lander and J.S. Satchell, High-temperature superconducting gradiometric SQUIDs and flux transformers **230**, 110
Kelley, R.J., see J.-L. Wang **230**, 189
Khlybov, E., see A. Podlesnyak **230**, 311
Kirsanov, N.A., see G.V. Bazuev **230**, 163
Klestov, S.A., see L.F. Cohen **230**, 1
Knorpp, R., A. Forkl, H.-U. Habermeier and H. Kronmüller, A new method to determine the critical current density of superconducting thin films based on magneto-optic measurements **230**, 128
Knupfer, M., G. Roth, J. Fink, J. Karpinski and E. Kaldis, Plasmon dispersion and the dielectric function in $YBa_2Cu_4O_8$ single crystals **230**, 121
Kobayashi, N., see Y. Miyazaki **230**, 89
Kochetkov, V., see A. Podlesnyak **230**, 311
Komosa, A.S., see J.A. Schlueter **230**, 378
Koren, G. and E. Polturak, Properties of $YBa_2Cu_3O_{7-\delta}$/$YBa_2Co_xCu_{3-x}O_y$/$YBa_2Cu_3O_{7-\delta}$ Josephson edge junctions with $0.1 \leqslant x \leqslant 0.3$ and the effect of flux flow on their normal resistance **230**, 340
Krasilnikov, V.N., see G.V. Bazuev **230**, 163
Kroeger, D.M., see L.J. Masur **230**, 274
Kronmüller, H., see R. Knorpp **230**, 128
Kupfer, H., see L.F. Cohen **230**, 1
Kuriyaki, H., see X.G. Zheng **230**, 306
Kwok, W.-K., see J.A. Schlueter **230**, 378

Lander, K., see M.N. Keene **230**, 110
Larbalestier, D.C., see J.-L. Wang **230**, 189
Lee, B.W., see L.M. Paulius **230**, 255
Lee, H.J., see M.W. Lee **230**, 292
Lee, M.W., M.F. Tai, H.J. Lee, H.L. Hwang and H.-C.I. Kao, Enhanced diamagnetism in $YBa_2Cu_3O_{7-\delta}$ by hydrogen-plasma treatment **230**, 292
Lefèbvre, S., see H. Renevier **230**, 31
Lera, F., see L.A. Angurel **230**, 361
Li, F.H., see Y.G. Peng **230**, 318
Li, X.-G., see L.-B. Wang **230**, 263
Liang, J.K., see J.R. Min **230**, 389
Liday, J., see Š. Chromik **230**, 82
Lin, C.-H., see H.-F. Cheng **230**, 267
Lin, H.-Y., see H.-F. Cheng **230**, 267
Lin, I.-N., see H.-F. Cheng **230**, 267
Lin, Y.F., see W.C. Chan **230**, 349
Liu, K.-S., see H.-F. Cheng **230**, 267
Liu, X.-M., see L.-B. Wang **230**, 263
Lo, J.-T., see H.-F. Cheng **230**, 267

Lombardo, L.W., see M.C. Hellerqvist **230**, 170
Lukin, N.V., see G.V. Bazuev **230**, 163
Lyashenko, V.I., see O.I. Gorsky **230**, 213

Maeno, Y., see K. Yoshida **230**, 371
Maley, M.P., see L.J. Masur **230**, 274
Mao, Zh.Q., see W.J. Yu **230**, 323
Maple, M.B., see L.M. Paulius **230**, 255
Marezio, M., see H. Renevier **230**, 31
Marfaing, J., see A. Benlhachemi **230**, 246
Masur, L.J., E.R. Podtburg, C.A. Craven, A. Otto, Z.L. Wang, D.M. Kroeger, J.Y. Coulter and M.P. Maley, Bi-axial texture in $Ca_{0.1}Y_{0.9}Ba_2Cu_4O_8$ composite wires made by metallic precursors **230**, 274
Matic, V.M., Low-temperature formation and length of O–Cu–O chains in $YBa_2Cu_3O_x$ material between stoichiometries $x=6.5$ and $x=7$ **230**, 61
McGuire, T.R., see B.A. Scott **230**, 239
Meng, R.L., see Y.Y. Sun **230**, 435
Min, J.R., J.K. Liang, X.L. Chen, C. Wang, C. Dong and G.H. Rao, The crystal structure of $(Pb_{0.5}Cd_{0.5})Sr_2(Y_{1-x}Ca_x)Cu_2O_7$ **230**, 389
Mirmelstein, A., see A. Podlesnyak **230**, 311
Mitzi, D.B., see B.A. Scott **230**, 239
Miyazaki, Y., H. Yamane, T. Kajitani, N. Kobayashi, K. Hiraga, Y. Morii, S. Funahashi and T. Hirai, Preparation, crystal structure and superconductivity of (C, Cu)(Sr, Ca)$_2$(Y, Ca, Sr)Cu_2O_7 **230**, 89
Mizuta, N., see X.G. Zheng **230**, 306
Moodenbaugh, A.R. and D.A. Fischer, Hole state density and superconductivity in oxygen-deficient $La_{2-x}Sr_xCuO_{4-y}$ and $YBa_2Cu_3O_{7-\delta}$ **230**, 177
Morii, Y., see Y. Miyazaki **230**, 89
Musso, J., see A. Benlhachemi **230**, 246
Myhra, S., see R. Zhao **230**, 75

Nakamura, F., see K. Yoshida **230**, 371
Naumann, D., see J.A. Schlueter **230**, 378
Navarro, R., see L.A. Angurel **230**, 361
Nieva, G.L., see J.G. Sereni **230**, 159
Noudem, J.G., J. Beille, D. Bourgault, A. Sulpice and R. Tournier, Optimization of texturing process by hot pressing of Bi–Pb–Sr–Ca–Cu–O (2223) ceramics **230**, 42

Ogborne, D.M. and M.T. Weller, The structure of $TlBa_2Ca_3Cu_4O_{11}$ **230**, 153
Otto, A., see L.J. Masur **230**, 274

Paulius, L.M., B.W. Lee, M.B. Maple and P.K. Tsai, Preparation and characterization of $Y_{1-x}Pr_xBa_2Cu_3O_{7-\delta}$ single crystals **230**, 255
Peng, Y.G., F.H. Li, X.J. Zhou and Y.S. Yao, Electron microscopy study on microstructures of infinite-layer compound $Sr_{0.86}Nd_{0.14}CuO_2$ **230**, 318
Perkins, G., see L.F. Cohen **230**, 1
Pike, W.T., see B.D. Hunt **230**, 141
Plackowski, T., D. Włosewicz, Z. Bukowski and K. Rogacki, Specific heat of $Sm_{1+x}Ba_{2-x}Cu_3O_y$ solid solution of orthorhombic and tetragonal structure **230**, 354
Podlesnyak, A., A. Mirmelstein, A. Voronin, B. Goshchitskii, T. D'yachkova, H. Kadyrova, V. Zubkov, Yu. Zainulin, V. Kochetkov, E. Khlybov, R. Rosenkranz and A. Furrer, Synthesis, crystal structure and inelastic neutron scattering in the infinite-layer compounds $Sr_{1-x}Nd_xCuO_2$ **230**, 311
Podtburg, E.R., see L.J. Masur **230**, 274
Polturak, E., see G. Koren **230**, 340

Ragel, C.V., see M. Vallet-Regí **230**, 407
Ramallo, M.V., C. Torrón and F. Vidal, Fluctuation-induced diamagnetism in biperiodic layered superconductors in the weak magnetic field regime **230**, 97
Ramesh, S. and M.S. Hegde, Bond-valence analysis of the charge distribution and internal stresses in the $RBa_2Cu_3O_{7-\delta}$ system (R = rare earth) **230**, 135
Ramírez, J., see M. Vallet-Regí **230**, 407
Rao, G.H., see J.R. Min **230**, 389
Ravi, S. and V. Seshu Bai, AC susceptibility study in the 85 K phase of the Bi–Sr–Ca–Cu–O system **230**, 51
Renevier, H., J.L. Hodeau, M. Marezio, M. Bessière, E. Elkaïm and S. Lefèbvre, Structural deformation in oxidized and reduced $YBa_2(Cu_{1-y}Co_y)_3O_{6+x}$ compounds $(0<y\leq 0.05)$ **230**, 31
Rillo, C., see L.A. Angurel **230**, 361
Rogacki, K., see T. Plackowski **230**, 354
Rosenkranz, R., see A. Podlesnyak **230**, 311
Roth, G., see M. Knupfer **230**, 121
Roy, T., see J.A. Schlueter **230**, 378
Rusakova, I., see Y.Y. Sun **230**, 435
Ryu, S., see M.C. Hellerqvist **230**, 170

Satchell, J.S., see M.N. Keene **230**, 110
Scavini, M., G. Chiodelli, G. Spinolo and G. Flor, Electrons and holes in undoped Nd_2CuO_4 **230**, 412
Schirber, J.E., see J.A. Schlueter **230**, 378
Schlueter, J.A., K.D. Carlson, J.M. Williams, U. Geiser, H.H. Wang, U. Welp, W.-K. Kwok, J.A. Fendrich, J.D. Dudek, C.A. Achenbach, P.M. Keane, A.S. Komosa, D. Naumann, T. Roy, J.E. Schirber and W.R. Bayless, A new 9 K superconducting organic salt composed of the bis(ethylenedithio)tetrathiafulvalene (ET) electron-donor molecule and the tetrakis(trifluoromethyl)cuprate(III) anion, $[Cu(CF_3)_4]$ **230**, 378
Scott, B.A., E.Y. Suard, C.C. Tsuei, D.B. Mitzi, T.R. McGuire, B.-H. Chen and D. Walker, Layer dependence of the superconducting transition temperature of $HgBa_2Ca_{n-1}Cu_nO_{2n+2+\delta}$ **230**, 239
Sereni, J.G., G.L. Nieva, J.G. Huber and L.E. DeLong, Low-temperature specific heat of the Th_7(Fe, Co, Ni)$_3$ pseudobinary superconductors **230**, 159
Seshu Bai, V., see S. Ravi **230**, 51
Shen, Y., see C. Træholt **230**, 425
Sheng, Z.Z., see O. Chmaissem **230**, 231
Shkuratov, S.I., Electron concentration in $YBa_2Cu_3O_{6.9}$ single

crystals determined from field electron emission spectroscopic measurements **230**, 283
Shustov, G.R., see O.I. Gorsky **230**, 213
Somekh, R.E., see B. Ghyselen **230**, 327
Spinolo, G., see M. Scavini **230**, 412
Suard, E.Y., see B.A. Scott **230**, 239
Subramaniam, C.K., A.B. Kaiser and H.Y. Tang, Thermoelectric power of superconducting Ba–K–Bi–O crystals **230**, 184
Sulpice, A., see J.G. Noudem **230**, 42
Sun, Y.Y., I. Rusakova, R.L. Meng, Y. Cao, P. Gautier-Picard and C.W. Chu, The 23 K superconducting phase YPd_2B_2C **230**, 435
Svetchnikov, V., see C. Træholt **230**, 297

Tai, M.F., see M.W. Lee **230**, 292
Tanaka, Y., see K. Yoshida **230**, 371
Tang, H.Y., see C.K. Subramaniam **230**, 184
Tarte, E.J., see B. Ghyselen **230**, 327
Tian, M.L., see W.J. Yu **230**, 323
Tokar, O.I., see D.V. Fil **230**, 207
Tollet, H., see Š. Chromik **230**, 82
Torrón, C., see M.V. Ramallo **230**, 97
Tournier, R., see J.G. Noudem **230**, 42
Træholt, C., J.G. Wen, V. Svetchnikov and H.W. Zandbergen, HREM study of the YBCO/MgO interface on an atomic scale **230**, 297
Træholt, C., J.G. Wen, H.W. Zandbergen, Y. Shen and J.W.M. Hilgenkamp, TEM investigation of $YBa_2Cu_3O_7$ thin films on $SrTiO_3$ bicrystals **230**, 425
Tsai, P.K., see L.M. Paulius **230**, 255
Tseng, T.-F., see H.-F. Cheng **230**, 267
Tsuei, C.C., see B.A. Scott **230**, 239

Vallet-Regí, M., J. Ramírez, C.V. Ragel and J.M. González-Calbet, Control of carbon impurities in 2212 superconducting phase **230**, 407
Vasquez, R.P., see B.D. Hunt **230**, 141
Vaudin, M.D., see J.-L. Wang **230**, 189
Vidal, F., see M.V. Ramallo **230**, 97
Voronin, A., see A. Podlesnyak **230**, 311
Voronkova, V.I., see L.F. Cohen **230**, 1

Walker, D., see B.A. Scott **230**, 239
Wang, C., see J.R. Min **230**, 389
Wang, H.H., see J.A. Schlueter **230**, 378
Wang, J.-L., X.Y. Cai, R.J. Kelley, S.E. Babcock, D.C. Larbalestier and M.D. Vaudin, Electromagnetic coupling character of [001] twist boundaries in sintered $Bi_2Sr_2CaCu_2O_{8+x}$ bicrystals **230**, 189
Wang, L.-B., X.-G. Li, W.-B. Wu, X.-M. Liu, J.-S. Zhu, Z. Chen, G.-E. Zhou and Y.H. Zhang, Occurrence of metallic bismuth in $Bi_2Sr_2CuO_x$ crystals irradiated by N^+ ions **230**, 263
Wang, Z.L., see L.J. Masur **230**, 274
Weller, M.T., see D.M. Ogborne **230**, 153
Welp, U., see J.A. Schlueter **230**, 378
Wen, J.G., see C. Træholt **230**, 297, 425
Wessels, L., see O. Chmaissem **230**, 231
Wille, L.T., see C.P. Burmester **230**, 16
Williams, J.M., see J.A. Schlueter **230**, 378
Włosewicz, D., see T. Plackowski **230**, 354
Wolf, T., see L.F. Cohen **230**, 1
Wu, W.-B., see L.-B. Wang **230**, 263

Yamane, H., see Y. Miyazaki **230**, 89
Yan, Y., see B. Ghyselen **230**, 327
Yang, Z.J., Focusing a charged-particle beam by a superconductor **230**, 419
Yao, Y.S., see Y.G. Peng **230**, 318
Yao, Y.S., see W.J. Zhu **230**, 385
Yashima, M., see M. Kakihana **230**, 199
Yin, B., see W.J. Zhu **230**, 385
Yoshida, K., F. Nakamura, Y. Tanaka, Y. Maeno and T. Fujita, Ion-size effects on the structure and superconductivity of La-214 compounds at 1/8 doping **230**, 371
Yoshimura, M., see M. Kakihana **230**, 199
Yu, W.J., Zh.Q. Mao, Sh.J. Feng, M.L. Tian, G.E. Zhou and Y.H. Zhang, $Ba_2(Cu_{0.7}Cd_{0.3})O_3$: a new double-center perovskite structure **230**, 323

Zainulin, Yu., see A. Podlesnyak **230**, 311
Zandbergen, H.W., see C. Træholt **230**, 297, 425
Zeldina, E.A., see O.I. Gorsky **230**, 213
Zhang, Y.H., see L.-B. Wang **230**, 263
Zhang, Y.H., see W.J. Yu **230**, 323
Zhao, R. and S. Myhra, Environmental degradation of $YBa_2Cu_3O_{7-x}$. A descriptive and predictive model **230**, 75
Zhao, Z.X., see W.J. Zhu **230**, 385
Zheng, X.G., N. Mizuta, H. Kuriyaki and K. Hirakawa, Critical current density of polycrystalline $YBa_2Cu_3O_{7-\delta}$ consisting of tin-coated grains **230**, 306
Zhou, G.-E., see L.-B. Wang **230**, 263
Zhou, G.E., see W.J. Yu **230**, 323
Zhou, X.J., see Y.G. Peng **230**, 318
Zhou, X.J., see W.J. Zhu **230**, 385
Zhu, J.-S., see L.-B. Wang **230**, 263
Zhu, W.J., Y.S. Yao, X.J. Zhou, B. Yin, C. Dong, Y.Z. Huang and Z.X. Zhao, Superconductivity at 30 K in the Nd_2CuO_4-type cuprate $Tm_{1.83}Ca_{0.17}CuO_4$ **230**, 385
Zhukov, A.A., see L.F. Cohen **230**, 1
Zubkov, V., see A. Podlesnyak **230**, 311

ELSEVIER

Physica C 230 (1994) 447–448

PHYSICA C

Analytic subject index to volume 230

AC susceptibility 51, 115, 361
Anions 207
Anisotropic superconductor 397
Antiferromagnetic order 397
Applications of high-T_c superconductors 110, 141, 213, 349, 419

BaF_2 technique 82
BEDT-TFF or ET 378
Bis(ethylenedithio)tetrathiafulvalene 378

Carbon impurities
–in $Bi_2Sr_2CaCu_2O_8$ 407
Carrier concentration 283, 412
–of $La_{2-x}Sr_xCuO_{4-y}$ 177
–of $YBa_2Cu_3O_{7-\delta}$ 177
Charge distribution 135
$CO_{3\text{-}compounds}$ 89
Composites 246
Composite wires 274
Conducting polyphenylene sulphide 246
Critical current density 9, 42, 128, 189, 274, 306, 349, 361
Critical state model 51
Crystal field 311, 397
Cu–O chains 61
Cu–O planes 239

Debye temperature 159, 354
Defect structures 16, 75
Degradation
–of $YBa_2Cu_3O_{7-x}$ 75

EELS 121
Electrical resistivity 184, 231, 246, 255, 267, 435
Electron emission spectroscopy 283
Electronic structure 199
–of $YBa_2Cu_4O_8$ 121
Electron–phonon coupling 159, 207

Fermi surface 283
Fluctuation effects 97
Fluorine distribution 82
Flux dynamics 1, 115, 340
Flux lattice 170
Flux-line-cutting 115
Flux pinning 1

Ginzburg–Landau theory 97
Grain alignment 42, 274
Grain boundaries 306, 425
–in $Bi_2Cu_2CaCu_2O_{8+x}$ 189
–in $Bi_2Sr_2CaCu_2O_8$ 407
Granular superconductivity 361

High-pressure effect 199, 378
High-pressure synthesis 385
HREM 297, 318
Hydrogenation 292

Inelastic neutron scattering 311
Interlayer phase coherence 170
Irradiation effect 263
Irreversibility line 115

Josephson effect 141, 327, 340
Josephson junction 9

Lattice dynamics 170, 199
Lattice parameters 153, 239, 292
Layered structure 9

Magnetic relaxation 1
Magnetic susceptibility 97, 163, 255, 292
Magnetic suspension 213
Magnetization 42, 349, 378, 397
Magnetooptics 128
Meissner effect 419
Metallic bismuth 263
Monte Carlo simulations 16, 170
Multilayers 141, 327

Neutron diffraction 89, 311
Non-ohmic behaviour 189
Normal-state properties 163, 184

Organic superconductors 378
Oxygen stoichiometry 61, 163, 177, 412

Percolation model 246
Phase diagram 61
Phonon spectrum 207
Proximity effect 327, 340

Raman scattering 199
Rare-earth cuprates
–in $Tm_{1.83}Ca_{0.17}CuO_4$ 385

Scanning electron microscopy
–of $Bi_2Sr_2CaCu_2O_8$ 407
Shapiro steps 327
Single crystal growth 397
Specific heat 159, 371, 397
–of $Sm_{1-x}Ba_{2-x}Cu_3O_y$ 354
SQUID 110
Structural phase transition 61, 163, 371
Structure
–of $Ba_2(Cu_{0.7}Cd_{0.3})O_3$ 323
–of $Bi_2Sr_2CuO_x$ 263
–of (C, Cu)(Sr, Ca)$_2$(Y, Ca, Sr)Cu_2O_7 89
–of $HgBa_2Ca_{n-1}Cu_nO_{2n+2+\delta}$ 231
–of $LaCu_{1-x}Ni_xO_{2.5+\delta}$ 163
–of $(Pb_{0.5}Cd_{0.5})Sr_2(Y_{1-x}Ca_x)Cu_2O_7$ 389
–of $RBa_2Cu_3O_{7-\delta}$ 135
–of $Sr_{0.86}Nd_{0.14}CuO_2$ 318
–of $Sr_{1-x}Nd_xCuO_2$ 311
–of $TlBa_2Ca_3Cu_4O_{11}$ 153
–of $Y_{1-x}Pr_xBa_2Cu_3O_{7-\delta}$ 255
–of $YBa_2(Cu_{1-y}Co_y)_3O_{6+x}$ 31
–of $YBa_2Cu_3O_7$ 425
–of $YBa_2Cu_3O_z$ 16
–of YBCO/MgO interface 297
–of YPd_2B_2C 435
Substitution effects 177
–in $La_{2-x}Ba_{x-y}M_yCuO$ (M=Sr, Ca) 371

–in $RBa_2Cu_3O_{7-\delta}$ 135
–in $Sm_{1-x}Ba_{2-x}Cu_3O_y$ 354
–in $YBa_2(Cu_{1-y}Co_y)_3O_{6+x}$ 31
Supertron 419
Surface reactivity 75
Synthesis
–of $Ba_2(Cu_{0.7}Cd_{0.3})O_3$ 323
–of $Bi_2Sr_2CaCu_2O_8$ 407
–of Bi–Pb–Sr–Ca–Cu–O 42
–of $Ca_{0.1}Y_{0.9}Ba_2Cu_4O_8$ 274
–of $HgBa_2Ca_{n-1}Cu_nO_{2n+2+\delta}$ 231, 239
–of Nd_2CuO_4 412
–of $(Pb_{0.5}Cd_{0.5})Sr_2(Y_{1-x}Ca_x)Cu_2O_7$ 389
–of $Sr_{1-x}Nd_xCuO_2$ 311
–of thin films 82
–of $Y_{1-x}Pr_xBa_2Cu_3O_{7-\delta}$ 255
–of $YBa_2(Cu_{1-y}Co_y)_3O_{6+x}$ 31
–of $YBa_2Cu_3O_{7-\delta}$ 292
–of $YBa_2Cu_3O_{7-\delta}$ 267
–of YPd_2B_2C 435

Tetrakis(trifluoromethyl)cuprate(III) anion 378
Thermoelectric effects 184, 412
Thin films 110, 128, 267, 297, 425
Twin boundaries 16
Type II superconductor 170

Vortex 9

Weak links 141, 189, 306

XPS 75, 263
X-ray diffraction 31, 153, 231, 239, 246, 263, 267, 323, 389, 435

ELSEVIER

Physica C 230 (1994) 449

PHYSICA C

Materials index to volume 230

$Ba_2(Cu_{0.7}Cd_{0.3})O_3$
–structure 323
–synthesis 323
$Bi_2Cu_2CaCu_2O_{8+x}$
–grain boundaries 189
$Bi_2Sr_2CaCu_2O_8$
–carbon impurities 407
–grain boundaries 407
–scanning electron microscopy 407
–synthesis 407
$Bi_2Sr_2CuO_x$
–structure 263
Bi–Pb–Sr–Ca–Cu–O
–synthesis 42

$Ca_{0.1}Y_{0.9}Ba_2Cu_4O_8$
–synthesis 274
Cu) (Sr,
–structure 89

$HgBa_2Ca_{n-1}Cu_nO_{2n+2+\delta}$
–structure 231
–synthesis 231, 239

$La_{2-x}Ba_{x-y}M_yCuO$
–substitution effects 371
$La_{2-x}Sr_xCuO_{4-y}$
–carrier concentration 177
$LaCu_{1-x}Ni_xO_{2.5+\delta}$
–structure 163

Nd_2CuO_4
–synthesis 412

$(Pb_{0.5}Cd_{0.5})Sr_2(Y_{1-x}Ca_x)Cu_2O_7$
–structure 389
–synthesis 389

$RBa_2Cu_3O_{7-\delta}$
–structure 135
–substitution effects 135

$Sm_{1-x}Ba_{2-x}Cu_3O_y$
–specific heat 354
–substitution effects 354
$Sr_{0.86}Nd_{0.14}CuO_2$
–structure 318
$Sr_{1-x}Nd_xCuO_2$
$Sr_{1-x}Nd_xCuO_2$
–structure 311
–synthesis 311

$TlBa_2Ca_3Cu_4O_{11}$
–structure 153

$Tm_{1.83}Ca_{0.17}CuO_4$
–rare-earth cuprates 385

$Y_{1-x}Pr_xBa_2Cu_3O_{7-\delta}$
–structure 255
–synthesis 255
$YBa_2(Cu_{1-y}Co_y)_3O_{6+x}$
–structure 31
–substitution effects 31
–synthesis 31
$YBa_2Cu_3O_7$
–structure 425
$YBa_2Cu_3O_{7-\delta}$
–carrier concentration 177
–synthesis 292
$YBa_2Cu_3O_{7-\partial}$
–synthesis 267
$YBa_2Cu_3O_{7-x}$
–degradation 75
$YBa_2Cu_3O_z$
–structure 16
$YBa_2Cu_4O_8$
–electronic structure 121
YPd_2B_2C
–structure 435
–synthesis 435